

(No Model.)

O. D. GRAY.  
EDUCATIONAL GLOBE.

No. 418,455.

Patented Dec. 31, 1889.

Fig. 1.

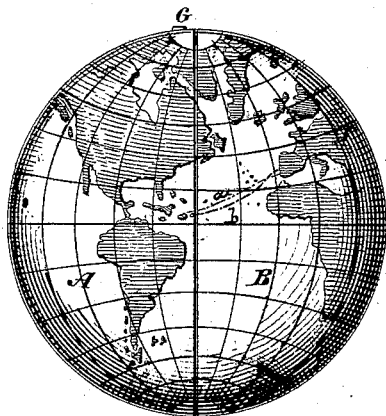


Fig. 2.

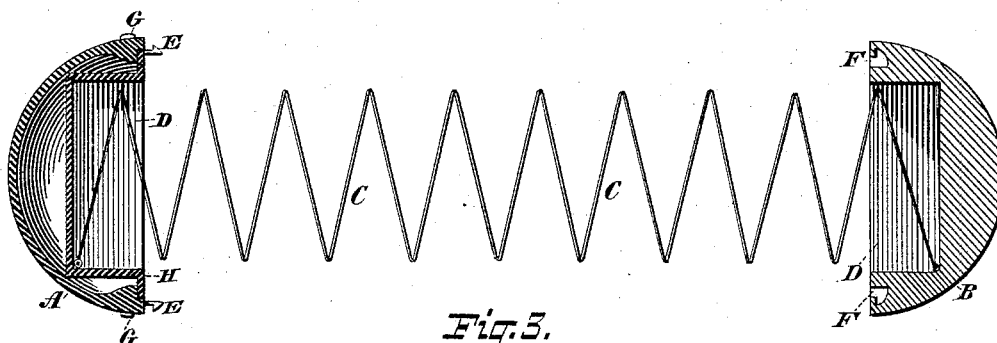
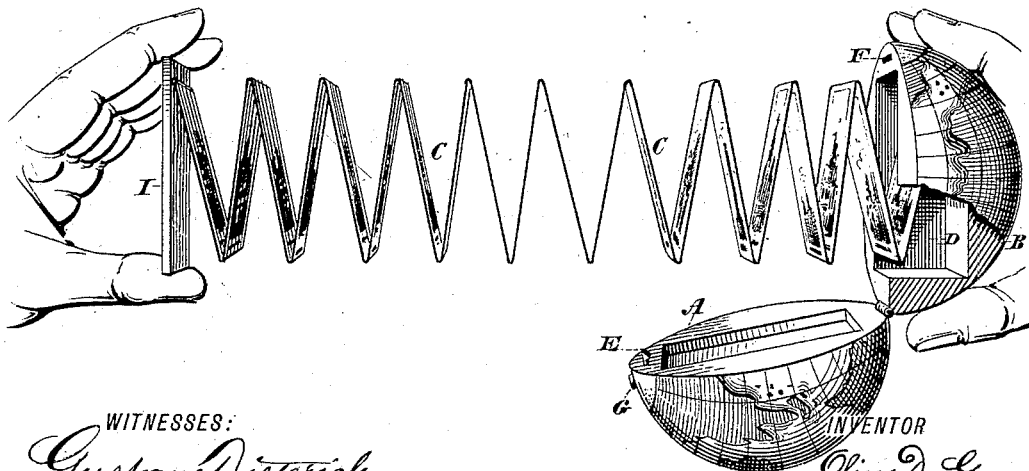


Fig. 3.



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# UNITED STATES PATENT OFFICE.

OLIN D. GRAY, OF NEW YORK, N. Y.

## EDUCATIONAL GLOBE.

SPECIFICATION forming part of Letters Patent No. 418,455, dated December 31, 1889.

Application filed November 18, 1889. Serial No. 330,757. (No model.)

*To all whom it may concern:*

Be it known that I, OLIN D. GRAY, a citizen of the United States, and a resident of New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Globes, (Educational,) of which the following is a specification.

The invention relates to improvements in globes; and it consists, essentially, of a globe constructed in sections and inclosing a strip of flexible material bearing pictures, said strip being capable of being extended or unfolded to disclose the picturesque representations thereon.

In the preferred form of the invention the globe will bear on its exterior surface a map of the world and illustrate by dotted lines the lines of travel taken by Christopher Columbus on his two voyages of discovery to the then New World, and said globe will be formed in two equal hemispherical sections provided at opposite edges with spring-catches or other fastening devices and forming within the globe a compartment containing the folded strip of material bearing the pictures. The sections of the globe may be constructed of wood with the interior compartment cut therein, or of pulp—such as paper or leather pulp—in which event the interior compartment for the flexible or extensible strip will be formed by securing rectangular boxes in the shells constituting the globe. It is preferred that the interior compartment of the globe be rectangular in outline, since thereby a flexible strip of the greatest uniform width throughout may be housed therein, and the durability of the article thus increased. The flexible strip will bear, by preference, on one of its faces pictures indicative of historical epochs since the discovery of the Western Hemisphere, and on its reverse face representations of buildings of the "World's Fair" and other matters of present interest.

The invention will be more fully understood from the detailed description hereinafter presented, reference being had to the accompanying drawings, in which—

Figure 1 is a plan view of the globe with a map of the world represented on the exterior surface thereof and the two lines of travel of

Columbus on his voyages of discovery designated by dotted lines; Fig. 2, a central vertical section of the globe with the hemispherical sections thereof separated and the flexible strip extended, this view for convenience representing one of said sections as made of wood and the other of pulp, with the rectangular box compartment secured therein; and Fig. 3, a perspective view of the globe, partly broken away, with its two sections hinged together at one edge and thrown open, the flexible strip being shown extended.

In the drawings, A B respectively designate the two hemispherical sections of the globe, and C the flexible strip confined within the compartment D, formed within said sections. The sections A B, when brought together, form the complete globe illustrated in Fig. 1, and may be held in the position indicated by the spring-catches E, provided at the opposite edges of one of said sections and engaging notches F, formed in the corresponding edges of the other of said sections. The spring-catches E will be actuated by the button G when it is desired to release them from the notches F.

Within the sections A B the compartment D may be formed in various convenient ways, two of which are illustrated in Fig. 2, in which the section B is shown as constructed of wood with the rectangular compartment D cut therein, while the section A is pressed up from pulp—such as paper or leather pulp—in the form of a shell, the compartment being formed by a rectangular box H, seated therein. One end of the flexible strip C is secured within the compartment of the section A, and the other end of said strip is secured within the compartment of the section B, and said strip is folded in order to obtain the greatest length of strip for the article. Upon pressure being applied to the buttons G, the spring-catches E may be released from the notches F and the two sections A B separated from each other, thereby extending or unfolding the flexible strip C and disclosing the picturesque representations displayed upon the opposite sides of the same.

If desired, the sections A B of the globe may be hinged together at one edge, as illustrated in Fig. 3, and a spring-catch provided

at the other edge, in which event one end of the flexible strip C will be secured in the compartment D of the section B, while the other end will be left free or secured to a removable block I, in order that it may be withdrawn and the strip unfolded or extended to disclose the representations displayed upon its opposite sides.

According to the construction illustrated in Fig. 3, that portion of the compartment D in the section A of the globe may be made shallow, if desired, while the portion of said compartment in section B of the globe may be made to contain the folded strip C.

Upon the exterior of the globe, as illustrated in Fig. 1, will be represented a map of the world, with the lines of travel taken by Christopher Columbus on his two voyages of discovery to the Western Hemisphere designated by dotted lines *a b*.

I do not limit myself to the precise details of construction, since, as illustrated in Figs. 2 and 3, the particular formation of the hemispherical sections A B, together with the manner of securing them together, may be varied to some extent without departing from the spirit of the invention.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. The globe containing an interior compartment, combined with the flexible strip bearing illustrations confined therein and adapted to be extended therefrom, substantially as set forth.

2. The globe made in separable sections and bearing on its exterior surface a map of the world, said globe containing an interior compartment, combined with the flexible strip confined therein and adapted to be extended therefrom, substantially as set forth.

3. The globe constructed of separable sections and bearing on its exterior a map of the world, said globe containing an interior rectangular-shaped compartment, combined with the folded strip confined therein and adapted to be extended therefrom, substantially as set forth.

4. The globe constructed of separable sections and bearing on its exterior a map of the world, said globe containing an interior compartment, combined with the folded strip confined therein and adapted to be extended therefrom, the ends of the strip being attached to the sections of the globe, substantially as set forth.

5. The globe constructed of separable sections and containing an interior compartment rectangular in outline, combined with the folded strip confined therein and adapted to be extended therefrom, substantially as set forth.

6. The globe bearing on its exterior surface a map of the world and containing an interior compartment, combined with the strip bearing illustrations confined therein and adapted to be extended therefrom, substantially as set forth.

7. The globe composed of sections provided with an interior compartment and spring-catches, combined with the strip bearing illustrations confined in said compartment and adapted to be extended therefrom, substantially as set forth.

Signed at New York, in the county of New York and State of New York, this 15th day of November, A. D. 1889.

OLIN D. GRAY.

Witnesses:

WM. MARSHALL,  
SYLVESTER POPE.